AMENDMENTS TO THE CLAIMS

Claims 1-40 (Cancelled).

- 41. (Currently Amended) An isolated nucleic acid molecule comprising a polynucleotide sequence selected from the group consisting of:
- (a) an isolated polynucleotide encoding a polypeptide corresponding to amino acids 1 to 409 of SEQ ID NO:6 including the start codon;
- (b) an isolated polynucleotide encoding a polypeptide corresponding to amino acids 2 to 409 of SEQ ID NO:6 minus the start codon;
- (c) an isolated polynucleotide encoding a mature polypeptide corresponding to amino acids 53 to 409 of SEQ ID NO:6;
- (d) an isolated polynucleotide encoding the TNF domain of the DmTNFv2 polypeptide corresponding to amino acids 316 to 332 of SEQ ID NO:6;
- [[(e)]](d) an isolated polynucleotide which represents the complimentary sequence (antisense) of (a), (b), or(c), or (d); and
- [[(f)]](e) a polynucleotide that hybridizes under stringent conditions to any one of the polynucleotides specified in (a)-[[(e)]](c), wherein said stringent conditions refers to a hybridization that is at least as stringent as the following conditions: an overnight incubation at 42 degree C in a solution comprising 50% formamide, 5x SSC (750 mM NaCl, 75 mM trisodium citrate), 50 mM sodium phosphate (pH 7.6), 5x Denhardt's solution, 10% dextran sulfate, and 20 μg/ml denatured, sheared salmon sperm DNA, followed by washing the filters in 0.1x SSC at about 65 degree C, wherein said polynucleotide does not hybridize under stringent conditions to a nucleic acid molecule having a nucleotide sequence of only A residues or of only T residues, and wherein said polynucleotide encodes a polypeptide having TNF activitywherein the complimentary sequence of said polynucleotide encodes a polypeptide that induces apoptosis in a cell or tissue in which said polypeptide is recombinately expressed.
- 42. (Previously Presented) The isolated nucleic acid molecule of claim 41, wherein said polynucleotide is (a).
- 43. (Previously Presented) The isolated nucleic acid molecule of claim 42, wherein said polynucleotide comprises nucleotides 634 to 1860 of SEQ ID NO:5.

- 44. (Previously Presented) The isolated nucleic acid molecule of claim 41, wherein said polynucleotide is (b).
- 45. (Previously Presented) The isolated nucleic acid molecule of claim 44, wherein said polynucleotide comprises nucleotides 637 to 1860 of SEQ ID NO:5.
- 46. (Previously Presented) The isolated nucleic acid molecule of claim 41, wherein said polynucleotide is (c).
 - 47. (Previously Presented) The isolated nucleic acid molecule of claim 46, wherein said polynucleotide comprises nucleotides 790 to 1860 of SEQ ID NO:5.
 - 48. (Cancelled).
 - 49. (Cancelled).
- 50. (Currently Amended) The isolated nucleic acid molecule of claim 41, wherein said polynucleotide is [[(e)]](d).
- 51. (Currently Amended) The isolated nucleic acid molecule of claim 41, wherein said polynucleotide is [[(f)]](e).
- 52. (Currently Amended) A recombinant vector comprising the isolated nucleic acid molecule of a member of the group consisting of claim 41(a), (b), (c), [[(d),]] and [[(f)]] (e).
- 53. (Previously Presented) A recombinant host cell comprising the vector sequences of claim 52.
 - 54. (Previously Presented) A method of making an isolated polypeptide comprising:
- (a) culturing the recombinant host cell of claim 53 under conditions such that said polypeptide is expressed; and
 - (b) recovering said polypeptide.
- 55. (Previously Presented) The isolated polynucleotide of claim 41 wherein said nucleic acid sequence further comprises a heterologous nucleic acid sequence.
- 56. (Previously Presented) The isolated polynucleotide of claim 55 wherein said heterologous nucleic acid sequence encodes a heterologous polypeptide.
- 57. (Previously Presented) The isolated polynucleotide of claim 56 wherein said heterologous polypeptide is the Fc domain of immunoglobulin.
- 58. (Currently Amended) An isolated nucleic acid molecule comprising a polynucleotide having a nucleotide sequence at least 80.0% identical to a sequence provided in claim 41, wherein percent identity is calculated using a CLUSTALW global sequence alignment according to the following parameters: gap opening penalty: 10; gap extension penalty: 0.5; gap separation penalty

range: 8; percent identity for alignment delay: 40%; and transition weighting: 0, and wherein said polynucleotide encodes a polypeptide having TNF activity wherein said polynucleotide encodes a polypeptide that induces apoptosis in a cell or tissue in which said polypeptide is recombinately expressed.

- 59. (Previously Presented) The isolated polynucleotide of claim 58 wherein said nucleic acid sequence further comprises a heterologous nucleic acid sequence.
- 60. (Previously Presented) The isolated polynucleotide of claim 59 wherein said heterologous nucleic acid sequence encodes a heterologous polypeptide.
- 61. (Previously Presented) The isolated polynucleotide of claim 60 wherein said heterologous polypeptide is the Fc domain of immunoglobulin.
- 62. (Currently Amended) The isolated nucleic acid molecule of claim 41(a), wherein the nucleotide sequence encodes a polypeptide comprising one or more amino acid deletions from the N-terminus beginning at amino acid position 1 of SEQ ID NO:6 up to and including amino acid 315 of SEQ ID NO:6, wherein said polynucleotide encodes a polypeptide having TNF activitywherein said polynucleotide encodes a polypeptide that induces apoptosis in a cell or tissue in which said polypeptide is recombinately expressed.
- 63. (Currently Amended) The isolated nucleic acid molecule of claim 41, wherein the nucleotide sequence encodes a polypeptide comprising one or more amino acid substitutions corresponding to amino acids 316 to 332 of SEQ ID NO:6, wherein said polynucleotide encodes a polypeptide having TNF activity wherein said polynucleotide encodes a polypeptide that induces apoptosis in a cell or tissue in which said polypeptide is recombinately expressed.
- 64. (Currently Amended) A recombinant vector comprising the isolated nucleic acid molecule of claim 41[[(e)]](d).
- 65. (Previously Presented) A recombinant host cell comprising the vector sequences of claim 64.
- 66. (Currently Amended) The isolated nucleic acid molecule of claim 41, wherein the nucleotide sequence encodes a polypeptide comprising one or more amino acid deletions from the C-terminus beginning at amino acid position 409 of SEQ ID NO:6 up to and including amino acid 333 of SEQ ID NO:6, wherein said polynucleotide encodes a polypeptide having TNF activitywherein said polynucleotide encodes a polypeptide that induces apoptosis in a cell or tissue in which said polypeptide is recombinately expressed.